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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/766,586	01/28/2004	Minoru Hoshino	S004-5198	3850

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EXAMINER

FERGUSON, MARISSA L

ART UNIT	PAPER NUMBER
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2854

DATE MAILED: 05/18/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/766,586

Applicant(s)

HOSHINO ET AL.

Examiner

Marissa L. Ferguson

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 17 February 2005.
2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 1-20 is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
10) ☒ The drawing(s) filed on 17 February 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☒ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1,8,12 –15,18 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Applicant Admitted Prior Art ("AAPA") in view of Yoshizawa et al. (US Patent 2004/0017454) and Oguchi et al. (US Patent 6,447,186).

AAPA teaches a printing apparatus (30) comprising printing means (32) for printing during a printing operation on a printable surface of a thermally sensitive adhesive sheet (21) having a thermally sensitive adhesive layer formed on a surface opposite to the printable surface, a first transporting means with at least one roller for undergoing rotation for transporting the thermally sensitive adhesive sheet in a predetermined direction (Page 2, last paragraph and Page 3, first paragraph), a cutter apparatus (41) for cutting the thermally sensitive adhering sheet by a predetermined length (Page 2, last Paragraph and Figure 14) after a printing operation by the printing means, drawing rollers (54), a thermally activating apparatus (50) comprising heating means (51) disposed at a preselected distance from the cutter apparatus for heating the thermally sensitive adhesive agent layer of the thermally sensitive adhesive sheet, and a second transporting means with at least one roller for undergoing rotation for transporting the thermally sensitive adhesive sheet in the predetermined direction.

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AAPA does not explicitly disclose a third transporting means with at least one roller for undergoing rotation for transporting the thermally sensitive adhesive sheet in the predetermined direction between the cutter apparatus and the thermally activating apparatus, a control means for independently controlling the first and second transporting means to thereby independently control a transporting speed of the thermally sensitive adhesive sheet during transportation thereof by the first and second transporting means and a third transporting means comprising a first drive mechanism for transporting the sheet in a predetermined direction.

Yoshizawa et al. teaches a inkjet recording apparatus that discloses a transporting means (71,72) with at least one roller undergoing rotation that are located between the cutter (61) and heat activating apparatus (41). However, he does not explicitly disclose a control means for independently controlling the first and second transporting means to thereby independently control a transporting speed of the thermally sensitive adhesive sheet during transportation thereof by the first and second transporting means. Oguchi et al. teaches a printing apparatus with controllers (3a,3b) that control transportation means independently of each other (Column 4, Lines 56-67), a first/second/third transporting means (14-16) and a third transporting means comprising a first drive mechanism for transporting a medium in a predetermined direction (Column 4, Lines 56-67).

It would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the invention as taught by AAPA to include transporting means as taught by Yoshizawa et al., since Yoshizawa et al. teaches that it

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is advantageous to provide an allowance of slack in order to prevent paper jam and to include a controller means as taught by Oguchi et al., since Oguchi et al. also teaches the prevention of excessive slack.

2. ¹⁶ Claims 2-7, 9-11, ¹⁷ 17 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Applicant Admitted Prior Art ("AAPA") in view of Yoshizawa et al. (US Publication 2004/0017454) and Oguchi et al. (US Patent 6,447,186) as applied to claims 1, 9, 14 and 15 above, further in view of Watanabe (US Patent 5,210,547).

Regarding claims 2-7, 17 and 19, AAPA, Yoshizawa et al. and Oguchi et al. teach the invention except for a third transporting means that is one or two or more of discharge rollers connected to a drive mechanism (moving means) via a one-way clutch, wherein a sensitive adhesive sheet is sandwiched between the discharge roller and a pressing member for pressing the thermally sensitive adhesive sheet against the discharge roller when the sheet is transported between the pressing and discharge rollers and a drive mechanism for rotationally driving the discharge roller while the pressing roller member presses the sheet in a direction. Watanabe teaches a thermal transporting system with a discharge roller (27) connected to gears (61-64 and can also function as moving means) via a one-way clutch (71) and a pressing/auxiliary roller (28) that transports a sheet in a predetermined direction (Column 7, Lines 51-68).

It would have been obvious at the time the invention was made to a person having ordinary skill in the art to further modify the invention as taught by AAPA to include discharge rollers as taught by Watanabe, since Watanabe

teaches that is advantageous to efficiently transmit power to the discharge roller via a drive system.

Regarding claims 9, 11 and 16, AAPA, Yoshizawa et al. and Oguchi et al. teach the invention claimed including a first transporting means including a platen roller, a second transporting means comprising a discharge roller as taught by Oguchi et al., however they do not explicitly disclose a drive mechanism with a stepping motor. Watanabe teaches a thermal transporting system with stepping motors (10 and 357). It would have been obvious at the time the invention was made to a person having ordinary skill in the art to further modify the invention as taught by AAPA to include a step motor as taught by Watanabe, since Watanabe teaches that is advantageous to provide accuracy to paper transportation means.

Response to Arguments

3. Applicant's arguments with respect to claims 1-7 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not

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mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marissa L. Ferguson whose telephone number is (571) 272-2163. The examiner can normally be reached on (M-T) 6:30am-4:00pm and every other(F) 7:30am-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Hirshfeld can be reached on (571) 272-2168. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Marissa L Ferguson
Examiner
Art Unit 2854




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